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(54) **Method and apparatus for contact lens mold filling and assembly**

(57) An apparatus for forming contact lenses, wherein front curve mold halves are filled with a hardenable transparent material, such as a polymerizable hydrogel, and back curve mold halves are coupled to the front curve, therein forming a lens. More Particularly, the apparatus includes a conveyor means for transporting pallets of mold halves to the apparatus, an array of piston structures for raising and aligning the back curves with respect to the filled front curve halves, reciprocating

means for reciprocating the piston array to couple pairs of front and back curves, and a vacuum chamber and vacuum drawing means for maintaining a vacuum around the curves during coupling. In addition, there is provided individual spring biasing to each reciprocating element whereby sensitivity to thickness variations and pallet misfeeds may be minimized. Further, there is provided a vacuum sleeve, through which the pistons reciprocate within the vacuum chamber, which sleeve preserves the vacuum within the chamber.

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EUROPEAN SEARCH REPORT

Application Number
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Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.6)
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The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 6 December 1996	Examiner Roberts, P
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

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